

Amendments to the Claims

The following represents the claims as amended/canceled according to the Amendment and Response filed on August 23, 2007, including the complete listing of the claims, i.e., claims 1-60.

1-60. (Cancelled)

61. (Currently Amended) A composition comprising a monoclonal antibody, or fragment thereof, having binding specificity to LTA Lipoteichoic acid (LTA) of Gram positive bacteria and a carrier, wherein the antibody i) binds to both coagulase positive and coagulase negative Staphylococci, ii) enhances opsonization of Gram positive bacteria by phagocytic cells by 75% or more over background as compared to an appropriate control in an in vitro opsonization assay, and iii) confers a statistically significant enhancement of survival or reduces bacteremia in an animal model, wherein the composition is formulated for pharmaceutical administration.

62. (Currently Amended) The composition monoclonal antibody of claim 61, wherein the opsonization assay is performed in the presence of complement, phagocytic cells, or both combination thereof.

63. (Currently Amended) The composition monoclonal antibody of claim 62, wherein the complement, or cells, or combination thereof is or both are human in origin.

64. (Cancelled)

65. (Currently Amended) The composition monoclonal antibody of claim 62, wherein the phagocytic cells are comprise macrophages, monocytes, neutrophils, or combinations thereof.

66. (Currently Amended) The composition monoclonal antibody of claim 62, wherein the opsonization is measured by determining comprises opsonophagocytic bactericidal activity.

67. (Currently Amended) The composition monoclonal antibody of claim 61, wherein the antibody is capable of binding to LTA of Gram positive bacteria fixed to a solid support.

68. (Currently Amended) The composition monoclonal antibody of claim 67, wherein the solid support is a plate well, bead, or micro-bead.

69. (Canceled)

70. (Currently Amended) The composition monoclonal antibody of claim 61 69, wherein the statistically statistically significant enhancement of survival in a lethal animal model is 25% or greater.

71. (Currently Amended) The composition monoclonal antibody of claim 61 69, wherein the statistically statistically significant enhancement of survival in a lethal animal model is 50% or greater.

72. (Currently Amended) The composition monoclonal antibody of claim 61 69, wherein the statistically statistically significant enhancement of survival in a lethal animal model is 70% or greater.

73. (Currently Amended) The composition monoclonal antibody of claim 61 69, wherein the statistically statistically significant enhancement of survival in a lethal animal model is 76% or greater.

74. (Currently Amended) The composition monoclonal antibody of claim 61 69, wherein the statistically statistically significant enhancement of survival in a lethal animal model is 90% or greater.

75. (Currently Amended) The composition monoclonal antibody of claim 61 69, wherein the statistically statistically significant enhancement of survival in a lethal animal model is between 67% and 83%.

76. (Currently Amended) The composition monoclonal antibody of claim 61-69, wherein the statistically statistically significant enhancement of survival in a lethal animal model is between 83% and 100%.

77. (Currently Amended) A composition comprising a monoclonal antibody, or antigen binding fragment thereof, having wherein the monoclonal antibody has binding specificity to LTA, wherein at least one heavy chain variable region or light chain variable region of the antibody has at least 70% amino acid identity with at least one the variable heavy or light chain variable region of a heavy chain, light chain, or both a heavy chain and light chain of Mab 110 the monoclonal antibody 96-110 MAB and a carrier.

78. (Currently Amended) The composition monoclonal antibody of claim 77, wherein the amino acid identity is at least 80%, 90%, or 95%.

79. (Currently Amended) The composition monoclonal antibody of claim 61-69, or 77, wherein the antibody comprises a portion of a human antibody sequence.

80. (Currently Amended) The composition monoclonal antibody of claim 79, wherein the portion of human antibody sequence comprises an Fc region.

81. (Currently Amended) The composition monoclonal antibody of claim 61-69, or 77, wherein the antibody specifically binds LTA exposed on the surface of the cell wall of Gram positive bacteria.

82. (Canceled)

83. (Currently Amended) The composition monoclonal antibody of claim 61-69, or 77, wherein the antibody specifically binds to LTA of Gram positive bacteria that are Staphylococcus epidermidis.

84. **(Currently Amended)** The composition monoclonal antibody of claim 61, or 69, or 77, wherein the antibody specifically binds to LTA of Gram positive bacteria that are *Staphylococcus epidermidis*, *Staphylococcus aureus*, or both *Staphylococcus epidermidis* and *Staphylococcus aureus*.

85. **(Currently Amended)** The composition monoclonal antibody of claim 61, or 69, or 77, wherein the antibody specifically binds to LTA of Gram positive bacteria that are multiple serotypes of *Staphylococcus epidermidis*, *Staphylococcus aureus*, or both *Staphylococcus epidermidis* and *Staphylococcus aureus*.

86. **(Currently Amended)** The composition monoclonal antibody of claim 85, wherein the antibody binds to multiple serotypes of *Staphylococcus aureus* are serotype 5, serotype 8, or both serotype 5 and serotype 8 of *Staphylococcus aureus*.

87. **(Currently Amended)** The composition monoclonal antibody of claim 61, or 69, or 77, wherein the antibody specifically binds to LTA of Gram positive bacteria that are *Staphylococcus epidermidis* and one or more Gram positive bacteria selected from the group consisting of *Staphylococcus aureus*, *Streptococcus mutans*, *Streptococcus faecalis*, and *Streptococcus pyogenes*.

88. **(Currently Amended)** A The composition of claim 61, wherein the monoclonal antibody, or fragment thereof, having binding specificity to LTA of Gram positive bacteria, wherein the antibody specifically binds to LTA of the Gram positive bacteria *Staphylococcus epidermidis* and *Staphylococcus aureus*.

89. **(Currently Amended)** The composition monoclonal antibody of claim 61 or 69, or 77, or 88, wherein the antibody specifically binds to LTA of Gram positive bacteria at a binding affinity of at least about 10^{-7} M or more.

90. (Currently Amended) The composition monoclonal antibody of claim 61 or, 69, 77, or 88, wherein the antibody specifically binds to LTA of Gram positive bacteria at a binding affinity of at least about 10^{-8} M or more.

91. (Currently Amended) The composition monoclonal antibody of claim 61 or, 69, 77, or 88, wherein the antibody specifically binds to LTA of Gram positive bacteria and reduces LTA-mediated inflammation, LTA-mediated cytokine production, or combination thereof.

92. (Currently Amended) The composition monoclonal antibody of claim 61 or, 69, 77, or 88, wherein the antibody is of an IgG, IgA, or IgM isotype.

93. (Currently Amended) The composition monoclonal antibody fragment of claim 61, 69, 77, or 88, wherein the antibody fragment is an Fab, Fab', F(ab')2, or sFv fragment of an antibody.

94. (Currently Amended) A polyclonal antibody composition comprising at least one of the antibodies The composition of claim 61 or, 69, 77, or 88, further comprising at least one additional monoclonal antibody having specificity for LTA.

95. (Currently Amended) A pharmaceutical composition comprising an effective amount of an antibody of claim 61, 69, 77, or 88, wherein the antibody binds LTA and is in a pharmaceutical carrier suitable for use in a human neonate humans.

96. (Withdrawn) A polynucleotide encoding an antibody, or fragment thereof, of claim 61, 69, 77, or 88.

97. (Withdrawn) The polynucleotide of claim 96, wherein the polynucleotide encoding the variable region of the antibody, or fragment thereof, has at least 70% identity to the polynucleotide set forth in FIG. 12.

98. (Withdrawn) A vector comprising the polynucleotide of claim 96.

99. **(Withdrawn)** A cell comprising the polynucleotide of claim 96 or the vector of claim 98.

100. **(Currently Amended)** An antibody, or fragment thereof, produced by ~~the cell of claim 99~~ a cell comprising a polynucleotide or vector comprising a polypeptide encoding an antibody of claim 61 or 77.

101. **(New)** The composition of claim 61, wherein the antibody is of the IgG isotype.

102. **(New)** The composition of claim 77, wherein the monoclonal antibody, or antigen binding fragment thereof, specifically binds to LTA of *Staphylococcus epidermidis* and *Staphylococcus aureus*.

103. **(New)** The composition of claim 61, wherein opsonization is enhanced by 75% or more over background.